

## MacWorks Plus II Checklist and Impatient Installation Guide

This checklist is not a substitute for reading the Installation and Usage Manual. We have tried to be as thorough as possible, so in certain instances our instructions may be redundant, but if the checklist is followed with the instructions provided in the manual, the overall installation is relatively simple.

Confirm that your MacWorks Plus II Package contains the following items:

- A black anti-static box containing the PFG board on anti-static foam.
  - A MacWorks Plus II Boot Disk and Install Disk located under the PFG anti-static foam.
  - A MacWorks Plus II Installation and Usage Manual.
  - This Checklist and and Technical and Non-compatibility Notes (please read before doing installation).
  - If you have ordered the 400K version, 400K Install Disk, 400K System Disks and 400K Install notes.
- We strongly recommend backing up at least data files and any other files not readily reproduced from master disks as outline on page 7 and caveats about floppy disk backups on pages 49 and 50, as well as Mac XL re-initialization problems on page 52 of the manual. HD Backup originally supplied with MacWorks Plus is unreliable, and should not be used. Where files exceed the capacity of your floppy disk, investigate compression programs such as Compactor Pro and Stuffit which are in the public domain or shareware or a commercial program such as Disk Doubler from Salient Software. Be sure that you can restore any backup that you make, PRIOR to re-initializing your hard disk.

### Hardware Installation - Do First

- 1. Read "Important notes about upgrading to MacWorks Plus II on page 7 first.
- 2. Take the necessary ESD precautions as explained on page 11 of the manual before proceeding.
- 3. During installation, have the manual open so that you can turn to the pages referred to.
- 4. Disconnect all cables from the peripheral connectors at the rear of the computer.
- 5. Remove the back cover - page 12, figure 1.
- 6. Remove the card cage - page 13, figure 2.
- 7. Identify the I/O board - page 14, figure 3.
- 8. Remove the I/O board - page 15, figure 4. and place it on a static-free surface.
- 9. Identify the Z8530 SCC - For the Lisa 2, pages 16 and 17 figure 5a. For the XL, pages 16 and 18, figure 5b.
- 10. Note the orientation of the Z8530 SCC - pages 16, 17 and 18, figures 5a. and 5b.
- 11. Remove the Z8530 SCC first paragraph - page 19 and figure 6, again noting orientation.
- 12. Examine the crystal at location 10C - pages 17, 18 and 19, figures 5a/5b and 6. Confirm that the crystal has a plastic covering. If not, insulate it now as per the last paragraph on page 19.
- 13. Locate the PFG circuit board - page 20.
- 14. Locate the PFG's serial number and the two wires with clips attached to the PFG. This is the top edge of the PFG. Figure 36 on page 89 may assist you.
- 15. Align the PFG over the now empty Z8530 SCC socket at location 9C of the I/O board - page 20, figure 7 and while watching and from the side, line up the two top-most pins with with the receptacles at the top end of the socket - page 20, figure 7.
- 16. Before pressing down, check the alignment of the PFG pins. Note that the last pin in each row has been cut off at the bottom end of the PFG. There should not be any PFG pins inserted into the two bottom-most receptacles of the PFG socket - page 20 second paragraph of "Align the PFG".
- 17. After checking the alignment of the PFG pins from the top and the side, inset the PFG into the socket by pushing it down in the area of the socket.

- ❑ 18. Prepare the Z8530 SCC. Before re-installing the Z8530 SCC in the PFG, we recommend that the pins of the Z8530 SCC be straightened and their spacing adjusted by putting the Z8530 SCC on its side (one row of pins flat on the table), and pressing down gently so as to make the pins more perpendicular to the body of the Z8530 SCC - page 21, figure 8. Repeat for the other side and check that both rows of pins are straight and the pins are evenly spaced.
- ❑ 19. Locate the top end (the notched end) of the Z8530 SCC.
- ❑ 20. Position the Z8530 SCC over the empty socket in the PFG with the notched end toward the top of the I/O board (as it was when you removed it). Make sure all of the Z8530 SCC pins are lined up with receptacles in the socket, and with gentle pressure, insert the Z8530 SCC into the socket on the PFG.
- ❑ 21. Check to make sure that all pins of the Z8530 SCC are in receptacles, and that they appear straight. Look especially for pins inadvertently folded under the Z8530 SCC. When properly installed, the top edge of the Z8530 SCC should line up with the top edges of the other two large components to its left.
- ❑ 22. Examine the PFG clips - page 22, figure 9.
- ❑ 23. Identify the 74LS132 at 6A - Using figures 5a/5b on pages 17/18 as a guide, locate the 74LS132 component in the top row of the I/O board at location 6A. This is one of the smaller black rectangular components. "74LS132" is printed on the component itself, and "LS132" is printed on the I/O circuit board to its left. Note the white dot on the circuit board near the top left corner of the component (the corner closest to the red ejector-latch); this is pin #1.
- ❑ 24. Attach the red clip. The following procedure is simple if followed exactly, but can cause problems if not done correctly. Please read page 23 and review figures 10a/10b and figure 10c on page 24 while installing the PFG clip.
- ❑ 25. Attach the black clip. Again, this procedure should be done while reading page 24 and if necessary, referring to figure 10a on page 23 for the exact location of pin #1.
- ❑ 26. Check the clips. Check that the metal grabber hook of each clip is connected to the prescribed pin alone, and is not making contact with any adjacent pin. We recommend that a small piece of tape be used to hold the wires to the I/O board assembly near the clips. This is to prevent accidental disconnection of the clips during normal handling.
- ❑ 27. Mark the clip locations. Once both hooks are attached, we suggest attaching a self-adhesive label or masking tape to the 74LS132 with a black and red line or mark, indicating the locations of the two contacts for future reference.
- ❑ 28. Relax, the hard part is over. This completes the PFG installation. Please re-check to make sure that you have attached the two wires to the 74LS132 component (location 6A) and that the two clips are properly connected to pins #1 and #5.
- ❑ 29. Double check that the PFG board is installed at location 9C.
- ❑ 30. Check that the crystal at 10C (under the PFG) has an insulating cover.
- ❑ 31. Check again that the Z8530 SCC is installed with the notched end towards the top of the I/O board, and that it is in line with the two large components to its left.
- ❑ 32. Re-install the I/O board - page 25
- ❑ 33. Re-install the card cage - page 25
- ❑ 34. Re-install the back cover - page 25.
- ❑ 35. Reconnect all the cables to the peripheral connectors at the rear of the computer, including the AC cord.

## Installing the MacWorks Plus II Software

The software installation section is divided into several parts, depending on your hardware configuration. Find the section that applies to your configuration first, then proceed to the section “Updating your System Folder” on page 4, which is common to all configurations. Be sure to read pages 27 and 28 first for a brief overview, prior to software installation.

**Installing without a hard disk.** If you do not have a hard disk, you do not need to “install” MacWorks Plus II itself; however, you may add the MacWorks Plus II CDEVs to your floppy System Disk(s).

- 1. Start-up with MacWorks Plus II. Use the MacWorks Plus II Boot Disk to start-up your X/Lisa with MacWorks Plus II according to the instructions in the section “Using the MacWorks Plus II Boot Disk,” on page 42.
- 2. Load the System. When you observe the floppy disk and question mark icon, insert a System Disk and wait until you are in the Macintosh Finder.
- 3. Update your System Folder. Continue with “Updating your System Folder” on page 37 after noting the following: Next time you start-up... Whenever you turn on your X/Lisa or go back to the self-test, you will need to use the MacWorks Plus II Boot Disk to start-up your X/Lisa with MacWorks Plus II according to the instructions in the section “Using the MacWorks Plus II Boot Disk.” You may avoid this inconvenience by installing a parallel port hard disk (available from your supplier) or a SCSI hard disk and the X/Lisa SCSI Accessories Card (LSAC - the LSAC is available only from Dafax Processing Corp.).

### Installing on a parallel port hard disk.

- 1. Turn on the hard disk. If you have an external parallel port hard disk, turn it on and allow it to finish warming up before turning on your X/Lisa (wait until the light on the front of the disk stops flickering). Make sure the parallel hard disk shows in the **STARTUP FROM** by pressing the space bar during the self-test. If it does not, refer to the “Trouble-Shooting” section starting on page 72.
- 2. Start-up with MacWorks Plus II. Use the MacWorks Plus II Boot Disk to start-up your X/Lisa with MacWorks Plus II according to the instructions in the section “Using the MacWorks Plus II Boot Disk,” (page 42) and type the left option key at the prompt to indicate that a floppy disk will be used as the System Disk (see “Starting up with a Macintosh Floppy System Disk,” page 47).
- 3. Load the System. When you observe the floppy disk and question mark icon, insert the MacWorks Plus II Install Disk and wait until you are in the Macintosh Finder.
- 4. Open the Installer. Open the “MW+II Basic Install” application on the floppy disk (do not copy the installer to your hard disk). The installer will look for parallel port hard disks and will enable one button for each parallel port hard disk available as shown in figure 11, page 30. The buttons for the expansion slots will not be enabled unless you have an Apple Dual Parallel Port Card installed in the associated slot.
- 5. Select the hard disk. The MacWorks Plus II Installer requests that you select a disk as shown in figure 11 on page 30.. Click the button associated with the port through which you wish to install MacWorks Plus II. If your X/Lisa has a SCSI disk and no parallel port hard disk, only the Cancel button will be enabled. If so, click Cancel to quit the installer and skip to the appropriate section. If you are sure your X/Lisa has a parallel port disk, yet only the Cancel button is enabled, proceed to the “Trouble-Shooting” section on page 71.
- 6. Consider initializing the hard disk. Please refer to pages 30 through 33 prior to initialization.
- 7. After MacWorks Plus II has been installed. After the installer has completed installing MacWorks Plus II on a newly initialized hard disk, figure 14 (800K) or 15 (400K) will appear as shown on pages 33/34. Proceed with the directions following the appropriate figure. Then proceed to the section “**Updating your System Folder**” on page 4.

## Installing on a SCSI hard disk, LSAC not installed

❑ Turn on the hard disk. If you have an external SCSI hard disk, turn it on and allow it to finish warming up before turning on your X/Lisa and follow the instructions on page 39 and the “Updating your System Folder” section below.

## Installing on a SCSI hard disk, LSAC installed

- ❑ 1. It is recommended that the LSAC be set to “debugging mode” (DIP-Switch 8 up) so that MacWorks Plus II loading messages will appear properly.
- ❑ 2. Turn on the hard disk. If you have an external SCSI hard disk, turn it on and allow it to finish warming up before turning on your X/Lisa and follow the instructions on page 40 and the “Updating your System Folder” section below. After System Folder updating, refer to page 41 - Re-load MacWorks Plus II.

## Installing with an XLerator

❑ At startup, use the space bar over-ride to select which mode is installed and the startup configuration. No other special installation instructions are required other than XLerator CDEV replacement as described below, and a review of the space bar over-ride menu on page 46. This setting is retained unless the PRAM is zapped.

## Updating your System Folder

Once in the Finder, you may install or update the System Folder on your System Disk(s).

- ❑ 1. We strongly recommend that you use Apple’s “Installer” application on the Apple System Tools Disk, as it attempts to leave your fonts and desk accessories intact (a System Software Upgrade Kit is available from Apple dealers or User Groups for a nominal fee). MacWorks Plus II Basic works well with System versions 6.0.5 and 6.0.8.
- ❑ 2. If you are using an X/Lisa with 1Mb of memory, use Apple’s “Installer” to install the “Minimum System for Macintosh Plus” to make most efficient use of your memory. System 6.0.5 without MultiFinder is recommended for use when memory is in short supply.
- ❑ 3. If you wish to use the X/Lisa as a client on a LocalTalk network (so that you may use files from a file server or System 7 Macintosh computers), also use Apple’s “Installer” application to install “AppleShare (workstation software).” Later you will use the Chooser to select your AppleShare server as documented in Apple’s “Macintosh Reference” manual.
- ❑ 4. **Remove the following CDEVs** from the System Folder as they are either not compatible or are no longer required with MacWorks Plus II; ❑ SUNtrol ❑ Moire or ZMoire v2.1.2 ❑ KillSound and associated files ❑ Pointing Device ❑ HD Backup ❑ **XLerator users** - ❑ @XLerator ❑ **LSAC users** - ❑ MW+ ❑ MW+ Loader, ❑ and all MW+Patches.(refer to page 40 for more specific instructions).
- ❑ 5. **Install the MacWorks Plus II Control Panel Devices.** If the MacWorks Plus II Install Disk is not already on the DeskTop, Insert it, and drag the ❑ Monitor and ❑ Floppy CDEVs from the install disk into the updated System Folder. If you have more than one hard disk, drag the ❑ Startup Device CDEV too. If you have more than one **STARTUP FROM** device, also drag the ❑ Disks CDEV. If you plan to use MacsBug or other debugging software, drag the ❑ Debug CDEV too. ❑ **XLerator users - Drag the new ❑ XLerator CDEV into the updated System Folder**
- ❑ 6. **LSAC users-** Copy the new LSAC files supplied with MacWorks Plus II ❑ **MW+Loader and ❑ MW+Basic Install**, into the System Folder of the SCSI disk that you wish the LSAC to use to load MacWorks Plus II. Rename the “**MW+II Basic Install**” application that has been copied into the System Folder to ❑ **MW+** (three letters exactly).
- ❑ 7. Configure the Control Panels (CDEVs) as required by referring to pages 52 through 70. If your hard disk was not the startup disk and you cannot access the CDEVs in the control panel, either “Restart” from the “Special Menu” or “Shutdown” and then configure the CDEVs when you reboot from the hard disk. This completes the installation.